## rent seeking

The study of 'rent seeking' is oriented around the competition for monopoly rents, the monopolies themselves being created and maintained by governments. 'Monopoly rents' are resources generated above and beyond those that might be procured by suppliers of services that are made available in a competitive fashion. The seminal analysis of rent seeking was done by Tullock (1967), while Krueger (1974) coined the term and brought significant attention to the issue. Aside from the term 'rent seeking', the work on this subject is also referred to as 'neo-classical political economy'. The study of rent seeking essentially modifies the time-honoured neo-classical analysis of WELFARE loss from monopoly (see NEO-CLASSICAL ECONOMICS). Let us say a government is considering instituting QUOTAS on selected imports. In the traditional analysis of welfare loss, the quota would restrict domestic consumption of the protected goods, raise domestic production of the goods, as well as raise their prices. The consequences of the quotas would be to generate both a welfare loss to society through distortions in consumption and production, and a redistribution of wealth from consumers to producers (the higher monopolistic price would redistribute surplus from consumers to producers). The traditional neo-classical analysis has equated welfare loss exclusively with distortions in consumption and production. The principal contribution of rent-seeking analysis has been to suggest that welfare loss is much more extensive than a simple efficiency loss from such distortions, but that the social costs of monopoly also include a loss equal to that surplus which was redistributed from consumers to producers. This occurs because the market for monopolistic privilege is highly competitive, on both the buyer's and seller's side (as often noted in the rent-seeking literature, 'the creation of monopolies is a competitive industry'). In other words, actors who can benefit from receiving a monopolistic privilege will expend resources in trying to obtain it, while government officials (who are candidates for these rewards as a result of having the power to grant monopoly privileges) will expend their own resources in trying to obtain them. In this respect, the contribution of rent seeking to the study of monopolistic inefficiency proceeds from the assumption that the creation of monopolies is not a costless process. In fact, it is just these costs that augment the traditional losses in efficiency that monopolies promote. It is a fundamental argument in this literature that the expenditure of such rent-seeking resources generates a social waste because they are used unproductively: they do not contribute to the creation of wealth in a society. The term DUP - 'directly unproductive profit seeking' - has been used extensively to describe such activity.

In the case of quotas, domestic producers (on the demand side) will compete in a multitude of ways to obtain protection for their goods: bribes, campaign contributions. lobbying fees and running ad campaigns in political districts, among other things. But politicians themselves (on the supply side) will compete to obtain these goods from domestic producers looking for protection: spend more time studying trade issues, invest more resources in convincing Congress or Parliament about the virtues of protection, familiarizing themselves with key import-competing industries. There are, as Buchanan (1980) pointed out, even wasteful consequences of creating third-party distortions. For example, export subsidies to one industry may lead other exporters to mobilize resources in competing for those transfers. In this case, all relevant wasteful activities from both the demand and supply sides apply. While Harberger's (1954) estimates of the social costs of monopoly, based on the neo-classical criteria, suggest a modest welfare loss, estimates which account for the social costs of rent seeking provided by Krueger (1974) and Posner (1975) suggest that the magnitude of monopolistic inefficiency can be quite substantial.

Of course, the act of rent seeking need not always result in welfare loss, especially where a second-best situation exists (that is, further market distortions actually lead to an improvement of welfare). Obvious examples would be situations in which third-party distortions generate counter-coalitions which encourage policies that promote more competition. For example, tariffs may mobilize free-trade groups, and regulation may provoke anti-trust coalitions. In both cases, the costs of rent seeking could be more than made up by the welfare gains of trade liberalization and competition.

## See also:

cartels; market failures; market power; second best, theory of

## References and further reading

Buchanan, J. (1980) 'Rent seeking and profit seeking', in J. Buchanan, R. Tollison and G. Tullock (eds) Toward a Theory of Rent-Seeking Society, College Station, TX: A&M University Press.

Colander, D.C. (1984) Neo-classical Political Economy, Cambridge, MA: Ballinger. Excellent collection of articles on directly unproductive profit seeking.

Harberger, A. (1954) 'Monopoly and resource allocation', *American Economic Review* 54 (May): 77-87.

Krueger, A.O. (1974) 'The political economy of the rent-seeking society', *American Economic Review* 64 (June): 291-303.

Posner, R. (1975) 'The social costs of monopoly and regulation', *Journal of Political Economy* 83 (August): 807-27.

Rowley, C.K., Tollison, R.D. and Tullock, G. (1988) The Political Economy of Rent Seeking, Boston, MA: Kluwer. Excellent collection of articles on rent seeking.

Tullock, G. (1967) 'The welfare costs of tariffs, monopoly and theft', Western Economic Journal 5 (June): 224-32.

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## research and development (R&D)

Technological developments, as well as other advances in the practices underlying economic activity, are often stimulated or even produced through the work of research and development (R&D) departments in companies. Additionally, the state may either support such activity directly through its TAX POLICY, or carry out R&D activities under its own auspices through the education sector or in defence-related research. In an information economy (see information society/economy) and especially in the knowledge industries, innovation is one of the key elements to competitiveness. In the content industries and services, R&D may have less direct impact on the character of the product offered, but may significantly affect its delivery. But while R&D has become one of the most valued aspects of economic organization, not all innovation stems from actual R&D activities. Some innovations are developed through production practices or organically outside the realm of the company altogether. Additionally, individual inventors may produce the advances on which further competitive development can be based, while many innovations are the application of advances in one sphere to the organization or processes of another.

Commercial, competitiveness-oriented R&D should also be carefully distinguished from basic research in as much as R&D focuses on applied uses of new discoveries, as well as incremental improvements of currently used technologies and processes. Basic research, conversely, focuses on discovery and exploration of new areas without due emphasis on application. In the past, the assessment of R&D activities has relied on the sum of inputs into formalized company R&D activities to reveal its extent. However, given the need to also recognize non-company specific R&D and other sources of innovation and competitiveness in the global political economy, the